

PAVLOVIC, V

"Body Liquids in Animals", "Is There Blue Blood in The Kingdom of Animals",  
p. 354. (NAUKA I PRIRODA) (Vol. 6, No. 8, 1953, Beograd, Yugoslavia )

SO: Monthly List of East European Accessions L. C. Vol.3, No. 4, April 1954

PAVLOVIC, V.

An economic battery one-tube receiver. p. 119.  
(Radioamater, Vol. 11, no. 4, Apr. 1957. Beograd, Yugoslavia)

SO: Monthly List of East European Accessions. (JRAL) IC, Vol. 6, No. 7,  
July 1957. Uncl.

PAVLOVIC, V.

Hoisting machinery with friction drums; the Koepe system  
using many ropes. p. 214. Vol. 11, No. 2, 1956.  
TEHNIKA. Beograd, Yugoslavia.

SOURCE: East European Accessions List, (EEAL) Library  
of Congress, Vol. 5, No. 8, August, 1956.

PAVLOVIC, Vasilije, prof. inz.

Principle of classifying belt conveyers in the main underground transport, and determination of their technical and structural characteristics. Rudar glasnik 2: 5-16 '64.

1. Faculty of Mining and Geology, University of Belgrade.

PAVLOVIC, Vasilija, ing., prof. (Beograd, Dalmatinska 100)

The influence of the conveyor capacity on the choice of vehicles of the main transportation system with locomotives. Tehnika Jug 17 no.3:465-469 '62.

1. Rudarsko-geoloski fakultet Univerziteta u Beogradu.

PAVLOVIC, V.

Locomotive transportation in open-pit work. p.1751. TEHNIKA.  
Beograd. Vol. 10, no. 12, 1955.

SOURCE: East European Accessions List (EEAL), Library of Congress  
Vol. 5, No. 6, June 1956

PAVLOVIC, V.

PAVLOVIC, V. The operational consumption of power by the Kakanj Thermoelectric Plant.  
p. 609.

Vol. 9, no. 11/12, Nov./Dec. 1956

ELEKTROPROVERDA

TECHNOLOGY

Beograd

So: East European Accession, Vol. 6, No. 3, March 1957

PAVLOVIC, VASILJE.

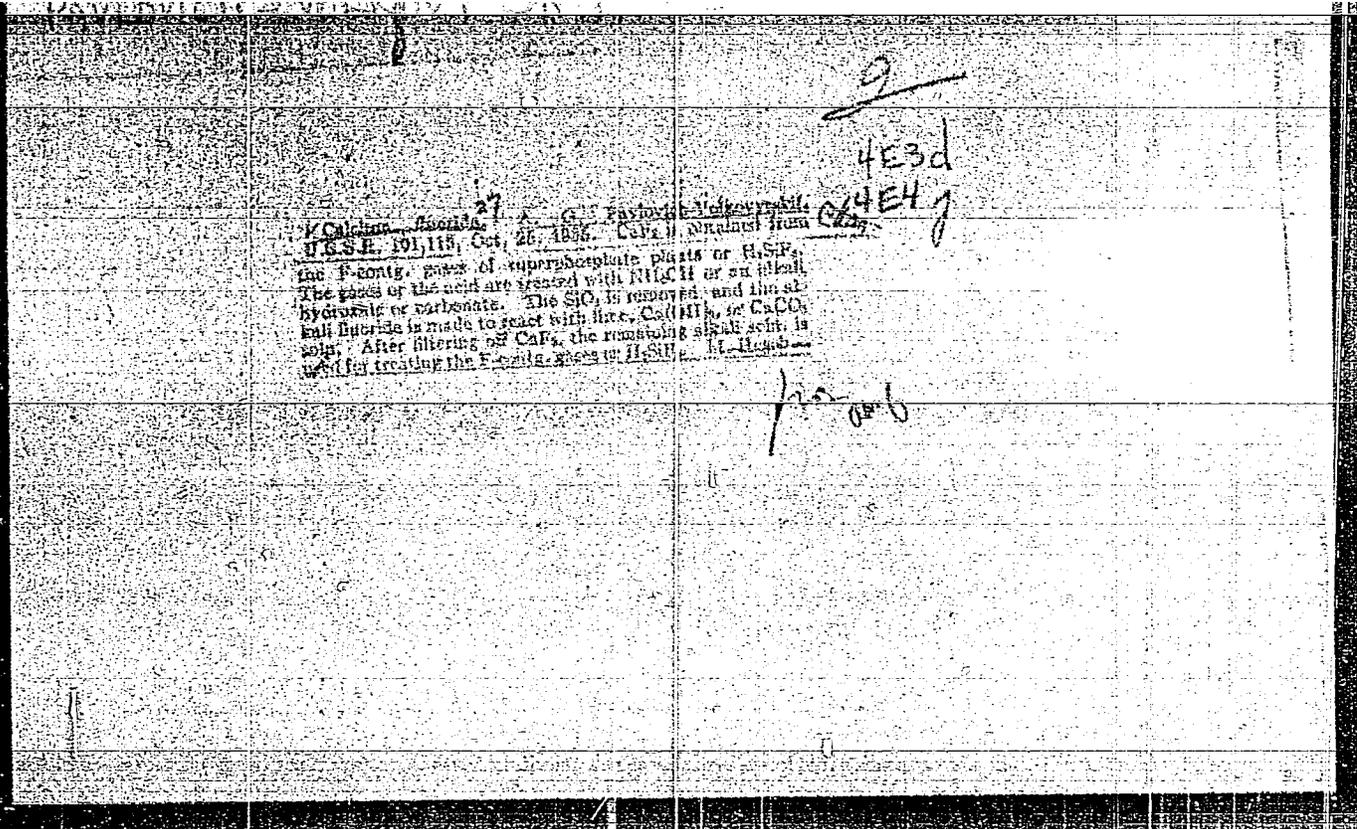
Pavlovic, Vasilije. Osnovi rudarskih merenja. Beograd, Rad, 1949. 74 p.  
(Principles of mining measurement. Diagrns.)

SO: Monthly List of East European Accessions, LC, Vol. 3, No. 1, Jan. 1954, Uncl.

KAMCEVSKI, Dorde, sanitetski pukovnik, dr.; PAVLOVIC, Vasilije, sanitetski  
potpukovnik, dr.; PRODANOV, Ljubomir, sanitetski major, dr.

Anterior tibial syndrome. Vojnosanit. pregl. 22 no.2:106-108  
F'65.

1. Vojna bolnica u Skoplju.



KEKIC, Halil; MLADENOVIC, Olivera; PAVLOVIC, Vojislav

Central and surface temperature of students while studying  
and during examinations. God Biol inst Sar 15 no.1/2:3-12 '62

1. Prirodno-matematički fakultet Univerziteta, Sarajevo.

PAVLOVIC, Vojislav; MLADENOVIC, Olivera; KEMIC, Halil; VUKOVIC, Tihomir

Sedimentation and number of erythrocytes, and concentration of hemoglobins in *Salmo trutta m. fario* L. and *Thymallus thymallus* L. from the area of the source of the Bosna River under seasonal and ecological conditions. Pt.2. God Biol inst Sar 15 no.1/2:55-76 '62

1. Prirodno-matematički fakultet i Biološki institut Univerzитета, Sarajevo.

PAVLOVIC VOJISLAV

*med* Glycogen content of heart and brain in deep hypothermia. Vojislav Pavloric (Univ. Belgrade). *Compt. rend. soc. Biol.* 149, 2216-17(1955).—in rats cooled to a body temp. of 15° brain glycogen is only very slightly decreased. Heart glycogen decreases 25-30% at first, but if the hypothermia is maintained for about 5 hrs. it returns to normal or above normal. L. B. Gilson

PAVLOVIC, V. N.

Yugoslavia (430)

Technology

Zbirka praktičnih problema iz jamskog transporta. Beograd, Naučna knjiga, 1951. 112 p. (Mine haulage; selected problems typical of Yugoslav mines. A textbook)

East European Accessions List. Library of Congress, Vol. 1, no. 13, November 1952. UNCLASSIFIED.

JANKOVIC, M.M.; MISIC, V.; POPOVIC, R.; DANON, J.; RADMI . S.; JOVANOVIĆ, B.;  
ZABIJANIN, V.; MICEVSKI, K.; MARINOVIC, R.Z.; DIKLIC, N.; NIKOLIC, V.;  
PAVLOVIC, Z.; TATIC, B.; BLEGIC, V.; STJEPANOVIC, Lj.; CEROVIC, M.

Review of periodicals; botany. Bul se Young 9 no.4/5:139-140  
Ag-U '64.

PAVLOVIC, Z.

Contribution to the knowledge of serpentine flora and  
vegetation of Mount Ozren near Sjerica. II. p. 1. (Belgrade.  
Prirodnjacki muzej srpske zemlje. GLASNIK. BULLETIN.  
SERIJA B: BIOLOSKE NAUKE. Beograd.) Vol. 7, no. 1, 1955.

SOURCE: East European Accessions List, (EEAL) Library of Congress,  
Vol. 5, No. 8, August, 1956.

PAVLOVIC, Z.

Acqueduct across the Sava River near Belgrade, p. 356, TEHNIKA, (Savez inzenjera i tehnicara Jugoslavije) Beograd, Vol. 9, No. 3, 1954

SOURCE: East European Accessions List (EEAL) Library of Congress,  
Vol. 5, No. 6, Aug. 1956

PAVLOVIC, Z.

Pasturage and prairie flora of the central section of the Kopaonik region. p. 47. (Belgrade, Prirodnjacki muzej srpske zemlje. GLASNIK. BULLETIN. SERIJA B: BIOLOSKE NAUKE. Beograd.) Vol. 7, no. 1, 1955.

SOURCE: East European Accessions List, (EEAL) Library of Congress, Vol, 5, No. 8, August, 1956.

PAVLOVIC, Z.

Yugoslavia (430)

Science

Meadows and pastures of Zlatibor, a mountain in Serbia. p. 61. **KBORNIK**  
RADOVA, Vol. 2, no. 1, 1950.

East European Accessions List. Library of Congress, Vol. 1, no. 14,  
Dec. 1952. UNCLASSIFIED.

PAVLOVIC, Z.

"Vegetation of Zlatibor Mountain" p. 115  
(ZBORNIK RADOVA, Vol. 11, no. 2, 1951, Beograd, Yugoslavia)

SO: Monthly List of East European Accessions, Library of Congress, Vol. 2,  
No. 10, October, 1953, Unclassified

MARTINOVIC, P.N.; PAVIC, D.; ~~PAVLOVIC-HOURNAC~~, M.; MIRKOVIC-ZIVKOVIC, N.

Study on the X-ray critical doses administered to the isolated suprarenal glands of infant rats. Bul sc Young '7 no.1/2:12 F-Ap '62.

1. Institut "B. Kidric," Vinca, Beograd.

\*

KORAC, D.; NIKOLIC, V.; PAVLOVIC-KENTERA, V.

Contribution to the study of the blood protein system in childbirth  
with erythroderma desquamativum. Acta med. iugosl. 16 no.1:1-14 '62.

1. Pedijatrijska klinika Medicinskog Fakulteta u Beogradu i Institut  
za medicinska istrazivanja u Beogradu.  
(ERYTHRODERMA) (BLOOD PROTEINS)

S

NIKOLIC, Bozidar; NIKOLIC, Vladislava; PAVLOVIC-KENTERA, Vera;  
VUKCEVIC, Zlatija; KORAC, Danica

The protein system of normal infants. Srpski arh. celok.  
lek. 90 no.9:809-817 S '62.

1. Institut za medicinska istrazivanja u Beogradu Direktor:  
prof. dr. Bozidar Dordevic. Centar za odojce i malo dete u  
Beogradu Upravnik: prim. dr. Zlatija Vukcevic. Pedijatrijska  
klinika Medicinskog fakulteta Univerziteta u Beogradu  
Upravnik: prof. dr. Borivoje Tasovac.  
(BLOOD PROTEINS)

5

KONECNI, Josin; PAVLOVIC-KENTERA, Vera; BUKICEVIC, Predrag; RAIMIC, Sava

A case of congenital methemoglobinemia. Srpski arh. celok. lek. 89  
no.10:1197-1201 0 '61.

1. Interna klinika A Medicinskog fakulteta Univerziteta u Beogradu  
Upravnik: prof. dr Branislav Stanojevic.

(METHEMOGLOBINEMIA in inf & child)

S

KORAC, D.; NIKOLIC, V.; PAVLOVIC-KENTERA, V.

A contribution to the studies on the albumen system in  
the blood of infants with desquamative erythrodermia.  
Glas SANU 12 no.2:226 '60 [publ.'62].

1. Saradnici Odeljenja za medicinu rada SANU, Beograd.

NIKOLIC, Bozidar; NIKOLIC, Vladislava; PAVLOVIC-KENTERA, Vera;  
STEFANOVIC, Stanoje

Paraproteinemia in malignant reticulosis. Review of the  
problem and our experience with 9 cases of multiple myeloma.  
Srpski arh. celok. lek. 91 no.4:359-370 Ap '63.

1. Institut za medicinska istrazivanja u Beogradu B. d. direktora:  
prof. dr Bozidar S. Dordevic.

(MULTIPLE MYELOMA)  
(BLOOD PROTEIN ELECTROPHORESIS)  
(BLOOD PROTEIN DISORDERS)

S

PAVLOVIC-KENTERA, Vera

Erythropoietin — a humoral stimulator of erythropoiesis. Srpski arh. celok. lek. 88 no.6:677-684. Je '60.

1. Odeljenje za medicinu rada Instituta za medicinska istrazivanja Srpske akademije nauka u Beogradu. Upravnik: akad. prof. dr Ilija Duricic.

(ERYTHROCYTES) (HEMATOPOIESIS)

PAVLOVIC, Zvonimir, inz.

Television and advertisement twoer on the marnet grounds  
of Belgrade. Zbor grad Univ Beograd 5 211-220 '62.

1. Redaktor, "Zbornik Gradevinskog fakulteta".

EGLITE, A.; MEZARAUF, V.; PAVLOVICA, D.

Conference on Agricultural and Soil Microbiology in Tashkent.  
Vestis Latv ak no.4:147-150 '62.

PAVLOVICA, D. (Riga)

Mutual relations of microorganisms in the plant rhizosphere.  
Vestis Latv ak no.3:155-160 '60. (EKAI 10:7)

1. Latvijas PSR Zinatnu akademijs, Mikrobiologijas instituts.  
(Microorganisms) (Soils) (Plants)

PAVLOVICA, D.

Conference on problems of actinomyces systematization. Vestis Latv ak  
no.10:187-188 '60. (KRAI 10:9:10)

(Actinomyces)

KONECNI, Josi; ANDREJEVIC, Milan; PAVLOVIC-KENTERA, Vera

Local application of hydrocortisone in the treatment of exudative tuberculous pleurisy. Srpski arh. celok. lek. 88 no.1:13-21 Ja '60.

1. Interna klinika A Medicinskog fakulteta Univerziteta u Beogradu, upravnik: prof. dr Branislav Stanojevic.

(TUBERCULOSIS PULMONARY ther.)

(HYDROCORTISONE ther.)

PAVLOVIC- VAGAJA, Milica

A case of endocraniosis in Kergagni-Stewart-Moreley syndrome  
and sterility. Srpski ark. celok. lek. 92 no.2:181-184 F'62.

1. Centar za zdravstvenu zastitu majke i deteta u Nisu.  
(pamir: dr. Miralica Budak-Petic).

PAVLOVICH, A

✓ 3321. Pavlovitch, A., Proportioning of concrete of specified properties with the help of fineness area. Part II: Fineness area (in German), *Bauzeitschrift* 13, 7, 234-239, July 1936.

Fineness modulus introduced by Abrams in 1916 is based on U.S. sieves. For this reason, for typical gradation of concrete aggregates A. Hummel proposed, in 1931, the "fineness coefficient," which can be expressed by any size of testing sieves. Author presents certain modifications of this coefficient which permit easy computation of average grading of the mix and exact relation to the Abrams fineness modulus. He calls this coefficient "fineness area" (Körnungsfäche). It determines also the consistency, proportions expressed in terms of weight and solid volume ( $1 m^3$ ), and is useful for determination of various stages of concreting. For comparison of the Abrams and Hummel coefficients, charts are drawn for plotting aggregate gradings with abscissas expressing the sieve sizes in logarithmic values and retained percentages as regular ordinates. The fineness coefficients are then expressed by the respective area (fineness area), not only for the total but also for partial grading (grading coefficients in individual stages of mixing).

Numerical and geometric interpretation of various relations, applied to examples and tabulated results, serve for better clarification of the modified fineness coefficients. References are made to books by G. Rothfuchs and A. Hummel.

J. J. Polivka, USA

PAVLOVICH, A.

2

3324. Pavlovich, A. Proportioning of concrete of specified properties with the help of frequency table. Part II: Density of concrete (in German), *bautechnik* 33, 10, 331-335, Oct. 1956.

Author discusses the standard definition of the density of concrete and derives his own formula for determining the density of fresh concrete. This empirical formula is checked by tests, with good results. On the basis of introduced values for variable cement content and grading, the degree of consistency and density is calculated and presented in diagrams. Furthermore, characteristics of various mixes are thoroughly discussed and expressed in formulas. From all these factors it is then easy to predict compressive strength of any type of concrete under a certain degree.

Author's derivations are compared with Feret's formula and with test results of Talbot, Richart and Sueneson. Applications of author's derivations will be discussed in parts III and IV of this paper.

J. J. Polivka, USA

FM 0076

PAVLOVICH, H

20398  
G/001/61/000/005/001/002  
D027/D10926.1200  
26.1100

AUTHOR: Pawlowitsch, A., Prof., Diploma Engineer (Dresden)

TITLE: On the characteristic values of aircraft engines

PERIODICAL: Deutsche Flugtechnik, no. 5, 1961, 175-184

TEXT: The purpose of the article is to define the most important characteristic values of aircraft engines in order to be able to judge constructional perfection as well as the economical aspect. This, however, requires comparison of various characteristics since the requirements for an aircraft engine are often contradictory. The development of new aircraft engines, therefore, is based on compromises in order to meet all requirements. The author begins his article by listing symbols and indices used;  $b$  = specific fuel consumption;  $F$  = Flow area, surface area;  $K$  = generalized characteristic value (according to Herb [Abstracter's note: Herb's value not defined]);  $m$  = mass;  $\dot{m}$  = mass rate of flow, mass consumption per time unit;  $n$  = rotor RPM;  $N$  = performance;  $P$  = pressure;  $S$  = jet thrust;  $w$  = relative velocity of flow;  $\bar{w}$  = equivalent velocity of flow;  $v$  = airspeed;  $\dot{S}$  = power-specific static thrust of propeller;  $\gamma$  = specific weight;  $\eta$  = output;  $\Lambda = (\dot{m}_L / \dot{m}_{L_1}) =$  rate

Card 1/22

20398

G/G01/61/000/005/001/002

On the characteristic value of aircraft engines D027/D109

of flow or by-pass ratio of by-pass turbine;  $v$  = specific equivalent power;  $\sigma$  = specific thrust;  $\tau$  = acceleration time;  $\Psi$  = power/frontal area ratio; A = propulsion medium; a = external flow of by-pass turbine; aeq = equivalent; B = fuel, fuel rate of flow; G = gas, gas rate of flow; H = condition of surrounding air; i = internal flow of by-pass turbine; L = air, rate of air flow; LS = propeller;  $N_{aeq}$  = equivalent power; o = measured on INA-standard day at sea level; S = related to exhaust cross section of jet nozzle or to gas condition in this cross section or to jet thrust; Tr = aircraft engine; W = related to propeller shaft. The author then lists the most important characteristics of aircraft engines which he considered to be: thrust, performance, fuel consumption, weight of power plant, and frontal area. The description includes jet thrust where he especially refers to Pawlowitsch, A. (Ref. 1: Ueber die Thermodynamik der Strahltriebwerke mit Berücksichtigung der einfachen Nachverbrennung [On the thermodynamics of the jet turbine with reference to simple afterburning]. Wiss. Z. TH Dresden 6 (1956/57) p 717-732 and Die Technik 13 (1958) p 358-362 and p 430-438). The author gives equations for jet thrust of rocket engines, jet engines and ramjet engines as well as of by-pass engines and turboprop engines. According to measurements carried out by Kulagin, I.I. (Ref. 2: Teoriya gazoturbinnikh reaktivnykh

Card 2/22

On the characteristic values of aircraft engines

20398  
G/001/61/000/005/001/002  
D027/D109

dvigateley [Theory of gas turbines for jet aircraft] Oborongiz, Moskva 1952) specific static thrust for medium and high performance propellers amounts to 0.01400 to 0.0200 kN/kW or 1.05 to 1.5 kp/PS<sup>2</sup> at respective rpm. For comparison purposes, the USSR has selected the measuring values

$$S = 0.01466 \frac{\text{kN}}{\text{kW}} \text{ or } 1.1 \frac{\text{kp}}{\text{PS}}$$

while Great Britain and the USA have chosen the measuring values

$$S = 2.6 \frac{\text{lb}}{\text{hp}} \text{ (equals } 0.01551 \frac{\text{kN}}{\text{kW}} \text{ or } 1.1632 \frac{\text{kp}}{\text{PS}} \text{ )}$$

These values have also been listed by Roxbee Cox, H. (Ref. 3: Gas Turbine, principles and practice, G. Newnes, London 1955). Table 1 contains the most important characteristic data of some modern jet engines (Tables 1-6 have been composed by Heidenreich, E., Diploma Engineer). The next subject is a brief description of fundamental equations for the calculation of the specific thrust. Characteristic data for specific static thrust measured on an INA standard day at sea level are given in Table 2 for the most important modern aircraft engines. With respect to performance of propeller

Card 3/22

20398  
G/001/61/000/005/001/002  
D027/D109

On the characteristic values of aircraft engines

$\dot{L}_0 = 103 \text{ to } 206 \frac{\text{kW}}{\text{kg/s}}$  or  $140\text{-}280 \frac{\text{PS}}{\text{kg/s}}$ . The author then explains the terms fuel consumption and specific fuel consumption and supplements these subjects by fundamental equations. Table 4 shows the specific fuel consumption for modern aircraft engines during static operation at sea level on INA standard day. The weight of the power plant and especially the specific weight are considered to be among the most important characteristic values of an aircraft engine because they characterize the already obtained technical state of development of the engine concerned. Table 5 shows specific weights of modern power plants. The specific weight of a ramjet engine is listed as an exception with reference to the maximum equivalent horsepower during static operation since it cannot be operated at stand-still. The power/frontal area ratio is then briefly explained and supplemented by Table 6 showing the power/frontal area ratio of aircraft engines. Long intervals between overhauls, simple operation and maintenance as well as quick readiness for operation are considered to be the main characteristic values defining the properties of an aircraft engine. Another important factor of gas turbines is the acceleration time which for modern engines is usually less than 10 seconds. A suggestion with reference to the combination

Card 5/22

On the characteristic values of aircraft engines

20398  
G/001/61/000/005/001/002  
D027/D109

follows: Roxbee Cox, H.: Gas Turbine, principles and practice, G. Kewnes, London 1955; Wilkinson, P. H.: Aircraft engines of the world 1958/59. Selbstverl. Washington, USA; Turbofans, a Survey of Current, Airline Powerplant, Flight 76 (1959) p 455-459; Aero engines 1960, Flight 77 (1960) p 367-387.

Card 7/22

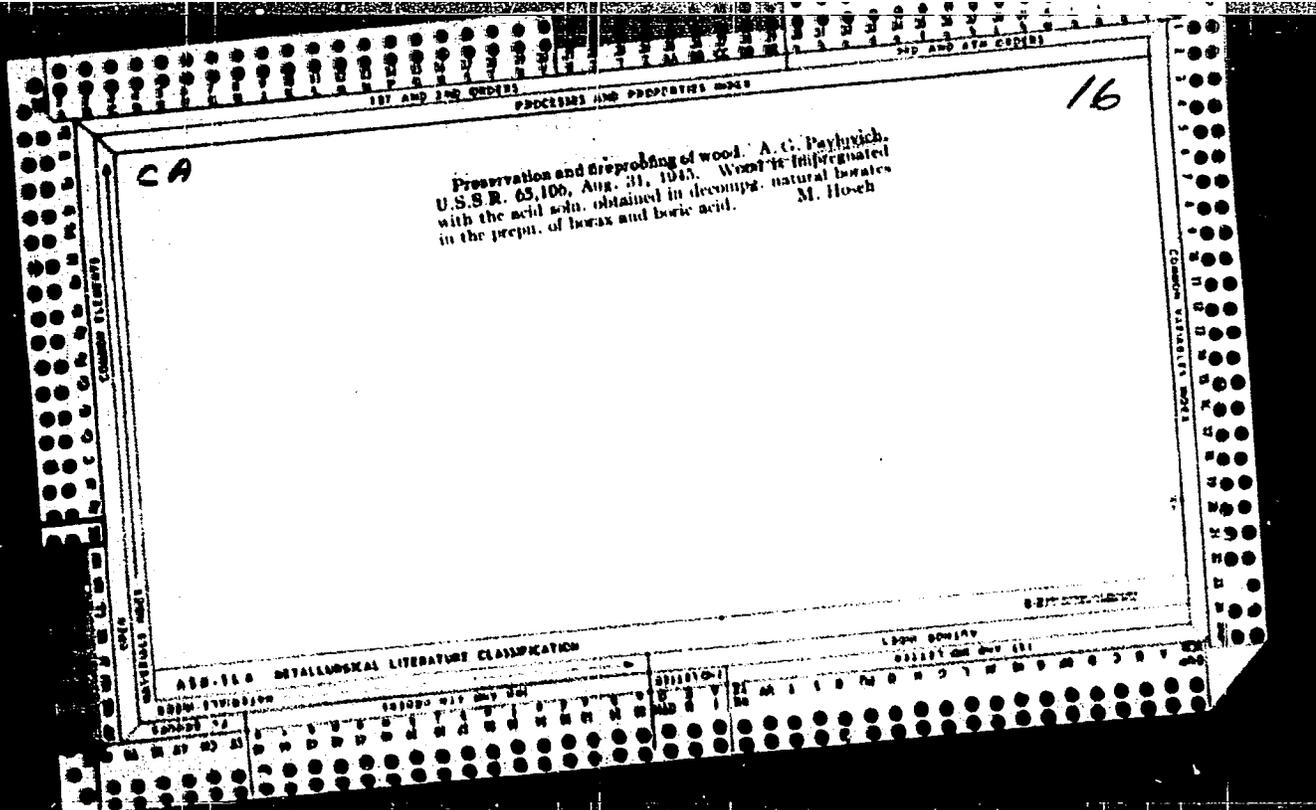
X

PAVLOVICH, A.

USSR

On-Improper distribution and Utilization of mineral Fertilizer Uzbekskaya SSR  
N: Truth of the East, Tashkent, 4 June 1947

SOURCE: Abstracted in USAF "Treasure Island" Report No. 30845, on file  
in Library of Congress, Air Information Division.



FEREDERIY, Ivan Alekseyevich; RYB'YEV, S.I., prof., doktor tekhn.  
nauk, retsenzent: PAVLOVICH, A.F., inzh., retsenzent;  
DENISOV, O.G., ispol. obyaz. prof., otv. red.

[Using high-strength gypsum in construction] Primenenie  
vysokoprochnogo gipsa v stroitel'stve. Kuibyshev n/Volge,  
Kuibyshevskii inzhenerno-stroitel. in-t, 1963. 284 p.  
(MIRA 17:6)

1. Zaveduyushchiy kafedroy stroitel'nykh materialov Vse-  
soyuznogo zaochnogo inzhenerno-stroitel'nogo instituta (for  
Ryb'yev). 2. Zamestitel' nachal'nika Upravleniya stroitel'-  
stva Kuybyshevskogo sovnarkhoza (for Pavlovich).

PAVLOVICH, A. N.

"On the Extent of Intestinal Cytopathogenic Viruses among the Population of the City of Dushanbe".

Report presented at the Scientific Conference of the Dushanbe Inst. of Epidemiology, Hygiene, Bacteriology, Virology and Parasitology, held in Dushanbe, December 1962, (Zdravookhraneniye Tadzhikistana, Dushanbe, No. 3, 1963 pp 40-41).

Report of co-workers of DIEG

PAVLOVICH, A. N.

"On the Extent of Intestinal Cytopathogenic Viruses among the population of the City of Dushanbe."

Report presented at the Scientific Conference of the Dushanbe Inst. of Epidemiology and Hygiene (DIEG) devoted to problems of Epidemiology, Hygiene, Bacteriology, Virology and Parasitology, held in Dushanbe, December 1962. (Zdravookhraneniye Tadzhikistana, Dushanbe, No 3, 1963 pp 40-41.)

co-worker of DIEG (Dushanbe Institute of Epidemiology and Hygiene.)

KASYMOV, K.; PAVLOVICH, A.N.

Effectiveness of a single immunization against poliomyelitis with  
trivalent live vaccine. Zdrav. Tadzh. 8 no. 2:28-33 '61.  
(MIRA 14:4)

1. Iz Stalinabadskogo instituta epidemiologii i gigiyeny.  
(POLIOMYELITIS)

PAVLOVICH, A.G., red.; LJR'YE, M.S., tekhn. red.

[Corrosion control in the chemical industry] Bor'ba s korroziei v khimicheskoi promyshlennosti. Moskva, Goskhimizdat, 1946. 133 p. (MIRA 15:4)

1. Russia (1923- U.S.S.R.) Ministerstvo khimicheskoy promyshlennosti. Otdel glavnogo mekhanika. (Corrosion and anticorrosives)

KASYMOV, K. T.; PAVLOVICH, A. N.

Isolation of the poliomyelitis viruses and other enteroviruses  
from children immunized a single time with a trivalent live  
vaccine against poliomyelitis. Zdrav. Tadzh. 9 no.2:15-20  
Mr-Ap '62. (MIRA 15:7)

1. Iz Dushanbinskogo instituta epidemiologii i gigiyeny.

(POLIOMYELITIS VACCINE) (POLIOMYELITIS VIRUSES)

KASYMOV, K.; PAVLOVICH, A.N.

Use of the mixture method for the identification of enteroviruses.  
Vop.virus. 7 no.6:736-737 N-D '62. (MIRA 16:4)

1. Dushambinskiy institut epidemiologii i gigiyeny.  
(VIRUSES)

SEKREBYAKOV, V.A.; PAVLOVICH, A.N.

Ways of eliminating typhus in Tajikistan. Zdrav. Tadzh. 6 no.6:  
8-14 '59. (MIRA 13:4)

1. Iz Stalinabadskogo Instituta epidemiologii i gigiyeny.  
(TAJIKISTAN--TYPHUS FEVER)

Pavlovich, D.

Mutual relationship of azotobacter with other groups of soil  
microorganisms. p.127

Latvijas PSR Zinatnu akademijs. Mikrobiologijas instituts. TRUDY  
Riga, Latvia. No.8, 1959

Monthly List of East European Accessions (EEAI) LC, Vol.8, no.11  
November 1959  
Uncl.

PAVLOVICH, D. Ya.            IN Latvian

PAVLOVICH, D. Ya. -- "Occurrence of Nitrobacteria in the Soils of the Latvian SSR."  
Acad Sci Latvian SSR, Inst of Microbiology, 1953. In Latvian (Dissertation for the  
Degree of Candidate of Biological Sciences)

SO: Izvestiya Ak. Nauk Latvivskoy SSR, No. 9, Sept., 1955

KUKAYN, R.A. [Kukain, R.], kand. med. nauk, red.; PLANDER, E.M. [Planders, E.],  
kand. med. nauk, red.; LAGANOVSKIY, S.Ya., kand. biol. nauk, red.;  
PAVLOVICH, D.Ya., kand. biol. nauk, red.; YAKOBSON, Yu.O.  
[Jakabsons, J.], kand. biol. nauk, red.; SHKLENNIK, Ch., red.;  
PILADZE, Ye. [Piladze, E.], tekhn. red.

[Micro-organisms and the environment] Mikroorganizmy i sreda. Riga,  
Izd-vo Akad. nauk Latviiskoi SSR, 1962. 142 p. (MIRA 16:2)

1. Latvijas Padomju Socialistiskas Republikas Zinatnu Akademija.  
Mikrobiologijas instituts.

(MICRO-ORGANISMS)

PAULOVICH, D. V.

✓ The distribution of azotobacter in the soil of Latvian S.S.R. D. V. Paulovich. *Trudy Inst. Mikrobiol. Akad. Nauk Latv. S.S.R.*, 1953, No. 2, 183-98; *Referat. Zhur. Biol.* 1953, No. 2301. — Two sets of soil samples were collected from 167 locales of the Republic at 2 separate intervals during the growing season, making a total of 334 samples. The presence of azotobacter was detd. by the nodular soil method and by cultivating in Ashby liquid medium. Azotobacter was found in all sod-podzolic soils which had a pH of 6.3-7.6, less frequently at pH of 6.0-6.8, more rarely at pH of 5.4-5.8. At pH 5.0-5.4 azotobacter was not found in that type of soil. The liquid-culture method yielded twice positive results than the soil-nodule method at pH 6.4-6.7. Azotobacter was always present in sod-podzolic soils, which contained 0.310-0.400% CaO, less frequently at 0.160-0.300% CaO, and rarely in soils with 0.060-0.160% CaO; in soils with 0.000-0.050% CaO this microorganism was absent. B. S. Levine

PAVLOVICH, G.A.; OSHCHENKOVA, A.P.; SOLOV'YEVA, T.V.

Rapid method for determining free sulfuric acid in mine waters.  
Nauch. trudy PermNIUI no.5:103-106 '63. (MIRA 18:3)

SYSUYEV, V.A.; PAVLOVICH, G.A.; GERTSEN, P.P., kand.tekhn.nauk

Preventing dust and poison gases by using water stemming in  
blasting operations. Bor'ba s sil. 5:147-150 '62. (MIRA 16'5)

1. Permskiy nauchno-issledovatel'skiy ugol'nyy institut.  
(Blasting—Equipment and supplies) (Mine dusts—Prevention)  
(Mine gases)

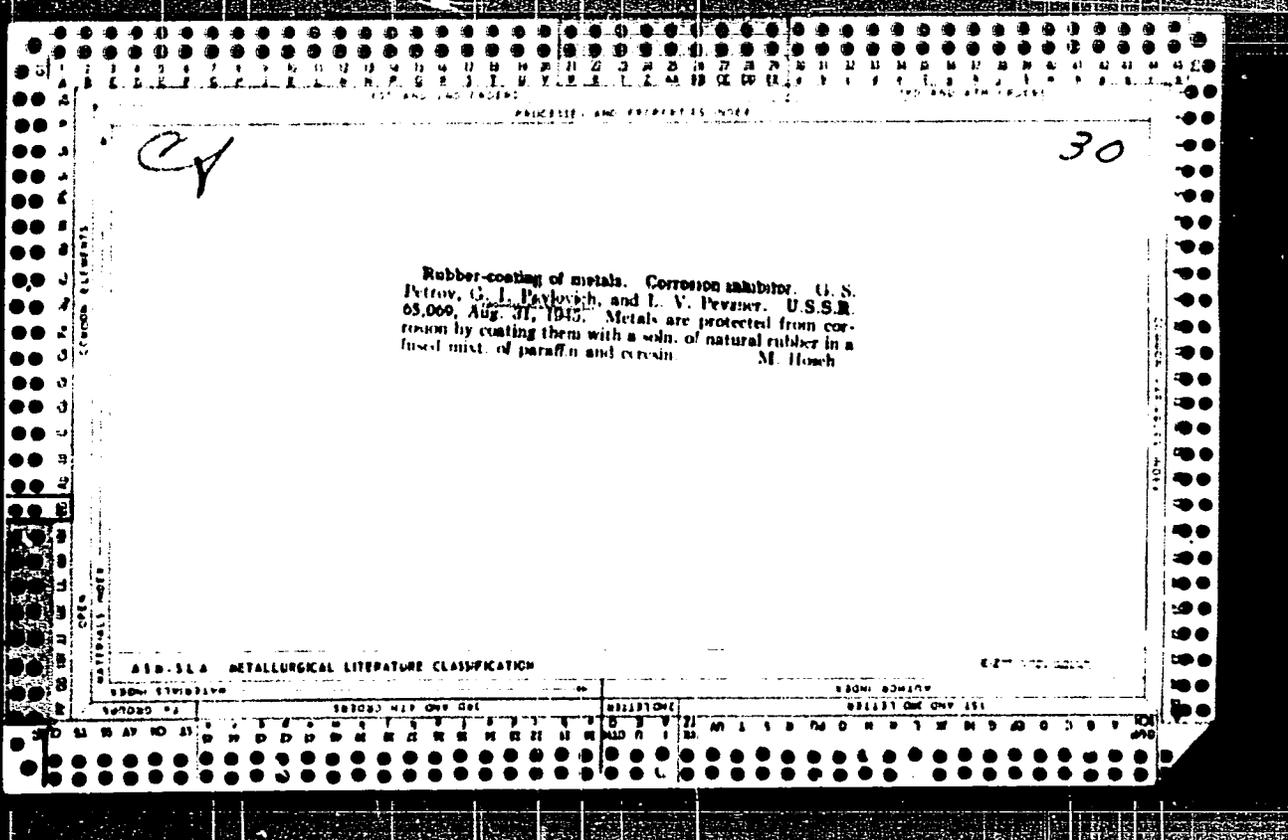
RARON, L.I., prof., doktor tekhn.nauk; PAVLOVICH, G.A., starshiy nauchnyy  
sotrudnik

Study of indications for a selection of tests under the gravimetric  
method of determining the dust content of mine air. Bor'ba s sil.  
3:164-171 '59. (MIRA 12:9)

(MINE DUSTS)

SAYKIVICH, G.A.; KOSYCHENKO, K.S.

Increasing the year real rate of interest . . . . .  
tekh.-ekon. inform. Gos. nauch.-issled. inst. . . . .  
inform. i statistika . . . . .



*draft*

*Coats Natural Rubber*

Butter-coating of metals. Corrosion inhibitor.  
G. S. PETROV, G. I. PAVLOVICH and L. V. PRYNER  
(U.S.S.R.), *Chem. Abstr.*, 1946, **40**, 7692.  
Metals are protected from corrosion by coating them  
with a solution of natural rubber in a fused mixture  
of paraffin and cerium. 3012.1

SCZINOV, A.A., kand. sel'skokhoz. nauk. KOZLOV I.G.; *ibid.*, 1965.

Fertilizers and the quality of grain. *Zemleveda* 27, no. 1, 66-67,  
Jan 1965. (MIRA 1965)

1. Vsesoyuznyy selektsionno-geneticheskiy institut.

PAVLOVICH, I. K.

Pavlovich, I. K. "The problem of the diagnostics of brucellosis," Trudy Stavrop. s.-kh. in-ta, Issue 3, 1949, p. 29-38

So: U-3566, 16 March 53, (Letopis 'Zhurnal 'nhkh Statey, No. 13, 1949)

PAVLOVICH, I. K.

Pavlovich, I. K. - "The question of deriving a nontoxic (ricinless) variety of castor plant by means of selecting the less poisonous seeds through the hemagglutination reaction," Trudy Stavrop. s.-kh. in-ta, Issue 3, 1948, p. 55-63

So: U-3566, 15 March 53, (Letopis 'Zhurnal 'nykt' Statey, No. 13, 1949)

*Pavlovich, D.*

YUGOSLAVIA/Chemical Technology. Chemical Products I-25  
and Their Application--Wood chemistry products.  
Cellulose and its manufacture. Paper.

Iss Jour: Ref Zhurn-Khim., No 3, 1955, 10029

Author : Khorovits, A. and Pavlovich, D.

Inst : Not given

Title : Khorovits, A.: Investigation of the Simple  
Ethers of Cellulose. II. The Appearance of  
Thixotropy in Solutions of Carboxymethylcellulose;  
Its Dependence on the Degree of Substitution  
and on Extent of Polymerization. Khorovits, A.  
and Pavlovich, D.: III. Dependence of the  
Viscosity of Carboxymethylcellulose on the Degree  
of Substitution.

Orig Pub: Glasnik Khimskog Pruzhtva, 1955, Vol 10, No 3,  
185-194; No 3, 197-200. (An Serbo-Croatian with  
an English summary)

Card 1/1

YUGOSLAVIA/Chemical Technology. Chemical Products I-25  
and Their Application--Wood chemistry products.  
Cellulose and its manufacture. Paper.

Abs Jour: Ref Zhur-Ihimiya, No 3, 1957, 10029

Abstract: take place in the solution. A decrease in the  
EP of I leads to a reduction in the thixotropy of  
the solutions.  
III. Preparations of I with DS and  $\eta = 20-200$   
have been investigated. The viscosity of solutions  
of I increases as the DS is gated. The Viscosity  
of solutions of I increases as the DS is increased,  
passes through a maximum, decreases, passes through  
a minimum, and again increases. This behavior  
is explained as follows. The cellulose molecule  
becomes more extended as the number of substi-  
tuents increases, thus encountering more resistance  
during passage through capillaries and offering  
greater resistance to a falling sphere. The intro-  
duction of substituents decreases the number of  
hydrophilic OH groups and the degree of hydration

Card 3/4

SERGEYEVA, T.Ya.; TSAREGRADSKAYA, N.A.; POPOV, V.I.; ANTONOVA, M.Ye.;  
PAVLOVICH, L.A.; SAKHAROVA, R.M.

Infectious nature of atrophic rhinitis in young pigs. Veterinaria 37 no.4:38-44 Ap'60. (MIRA 16:6)

1. Nauchno-proizvodstvennaya laboratoriya po bor'be s boleznyami molodnyaka sel'skokhosyaystvennykh zhivotnykh Ministerstva sel'skogo khozyaystva RSFSR.  
(SWINE—DISEASES AND PESTS)

PAVLOVICH, L. A., SAKHAROVA, R. M., SERIEYEVA, T. Ya., ~~T~~BAREGRADSKAYA, ~~AN~~ N.A.,  
POPOV, V. I. and ANTONOVA, M. E.

"About infectious nature of atrophical hog rhinitis."

Veterinariya, Vol. 37, No. 4, 1960, p. 38

*Sci. Res. Lab for Struggle Against Diseases Young Agric Animals, MSKh, RSFSR*

MAKHMANOVICH, B.M.; LIPSHITS, V.V.; PAVLOVICH, L.A.

Fermentation of vegetable waste hydrolysates mixed with  
molasses by *Clostridium acetobutylicum*. Prikl. biokhim. i  
mikrobiol. i no. 6:635-639 N-D '65. (MIRA 18:12)

1. Institut mikrobiologii i virusologii AN UkrSSR. Submitted  
July 11, 1965.

PAVLOVICH, I. A.

Histological diagnosis of infectious atrophic rhinitis in swine.  
Veterinariia 41 no.1:45-48 Ja '66. (MIRA 18:2)

1. Nauchno-proizvodstvennaya laboratoriya po bor'be s boleznyami  
molodnyaka sel'skokhozyaystvennykh zhivotnykh Ministerstva  
proizvodstva i zagotovok sel'skokhozyaystvennykh produktov RSFSR.

DOBRINSKAYA, Mariya Aronovna; PAVLOVICH, Natal'ya Andronikovna; PANYUKOV,  
A.N., red.; CHUNAYEVA, Z.V., tekhn. red.

[Manual of biochemistry for medical schools] Uchebnik biologicheskoi khimii dlia meditsinskikh uchilishch. Izd.2., dop. i perer.  
Leningrad, Medgiz, 1961. 230 p. (MIRA 14:12)  
(BIOCHEMISTRY)

PAVLOVICH, N.A.

DOBRIISKAYA, N.A.; PAVLOVICH, N.A.

[Textbook of biological chemistry; for medical schools] Uchebnik  
biologicheskoi khimii; dlia meditsinskikh uchilishch. [Leningrad]  
Medgiz, 1957. 175 p. (MIRA 11:5)  
(BIOCHEMISTRY)

PAVLOVICH, Nataliya Andronnikovna; PRONINA, A.Ye. redaktor; KULEVA, M.S.,  
tekhnicheskii redaktor

[Textbook of analytical chemistry; for secondary medical schools]  
Uchebnik analiticheskoi khimii; dlia srednikh meditsinskikh shkol.  
Izd. 2-oe, ispr. [Leningrad] Gos. izd-vo med. lit-ry, Leningrad-  
skoe otd-nie, 1956. 213 p. (MLBA 9:8)  
(Chemistry, Analytical)

PAVLOVICH, Natal'ya Andronikovna; GRIVA, Z.I., red.; RULEVA, M.S., tekhn. red.

[Manual of analytical chemistry for medical schools] Uchebnik analiti-  
cheskoi khimii; dlia meditsinskikh uchilishch. Izd.3., ispr. i dop.  
Leningrad, Gos. izd-vo med. lit-ry Medgis, Leningr. otd-nie, 1961.  
211 p. (MIRA 14:7)

(Chemistry, Analytical)

PAVLOVICH, N. A.

USSR .

~~Pavlovich, N. A.: Uchebnik analiticheskoi khimii  
dlya srednikh i stariinskikh shkol (Textbook of Analytical  
Chemistry for Secondary Medical Schools). Leningrad:  
Medgiz, Leningrad, Otdel. 1952. 217 pp.~~

*gfw*

PAVLOVICH, N.B.

LEVCHENKO, G.I., admiral, otvetstvennyy red.; DEMIN, L.A., dots., kand. geogr. nauk, inzh.-kontr-admiral, glavnyy red.; FRUMKIN, N.S., polkovnik, zamestitel' otvetstvennogo red.; ABAN'KIN, P.S., admiral, red.; AIAPUZOV, V.A., prof., kand. voenno-morskikh nauk, admiral, red.; ANAN'ICH, V.Ye., kontr admiral zapasa, red.; ACHKASOV, V.I., kand. istor. nauk, kapitan 1 ranga, red.; BARANOV, A.N., red.; BELLI, V.A., prof., kontr-admiral v otstavke, red.; BESKROVNIY, I.G., prof., doktor istor. nauk, polkovnik zapasa, red.; BOLTIN, Ye.A., kand. voen. nauk, general-mayor, red.; VERSHININ, D.A., kapitan 1 ranga, red.; VITVER, I.A., prof., doktor geogr. nauk, red.; GIL'FOND, G.M., dots., kand. voenno-morskikh nauk, kapitan 1 ranga, red.; GLINKOV, Ye.G., inzh.-kontr-admiral v otstavke, red.; YHLISEYEV, I.D., vitse-admiral, red.; ZOZULYA, P.V., admiral, red.; ISAKOV, I.S., prof., Admiral Flota Sovetskogo Soyuza, red.; KAVRAYSKIY, V.V. [deceased], prof., doktor fiz.-mat. nauk, inzh.-kontr-admiral v otstavke, red.; KALESNIK, S.V., red.; KOZLOV, I.A., dots., kand. voenno-morskikh nauk, kapitan 1 ranga, red.; KOMAROV, A.V., vitse-admiral, red.; KUDRYAVTSEV, M.K., general leytenant tekhnicheskikh voysk, red.; LYUSHKOVSKIY, M.V., dots., kand. istor. nauk, polkovnik, red.; MAKSIMOV, S.N., dots., kand. voenno-morskikh nauk, kapitan 1 ranga, red.; OKUN', S.B., prof., doktor istor. nauk, red.; ORLOV, B.P., prof., doktor geogr. nauk, red.; PAVLOVICH, N.B., prof., kontr-admiral v otstavke, red.; PANFAL'EYEV, Yu.A., admiral, red.; PITERSKIY, N.A., kand. voenno-morskikh nauk, kontr-admiral, red.; PLATONOV, S.P., general-leytenant, red.; POZNYAK, V.G., dots., general leytenant, red.; SALISHCHEV, K.A., prof., doktor tekhn. nauk, (Continued on next card)

LEVCHENKO, G.I.—(continued) Card 2.

red.; SIDOROV, A.L., prof., doktor istor. nauk., red.; SKORODUMOV, L.A., kontr-admiral, red.; SHEZHINSKIY, V.A., prof., doktor voenno-morskikh nauk, inzh.-kapitan 1 ranga, red.; SOLOV'YEV, I.N., dots., kand. voenno-morskikh nauk, kapitan 1 ranga, red.; STALBO, K.A., kontr-admiral, red.; STEPANOV, G.A. [deceased], dots., vitse-admiral, red.; TOMASHEVICH, A.V., prof., doktor voenno-morskikh nauk, kontr-admiral v otstavke, red.; TRIBUTS, V.P., kand. voenno-morskikh nauk, admiral, red.; CHERNYSHOV, P.I., kontr-admiral, red.; SHVETZ, Ye.Ye., prof. doktor voenno-morskikh nauk, kontr-admiral, red.; CHURBAKOV, A.I., tekhn. red.; VASIL'YEVA, Z.P., tekhn. red.; VIZIROVA, G.N., tekhn. red.; GOROKHOV, V.I., tekhn. red.; GRIN'KO, A.M., tekhn. red.; KUBLIKOVA, M.M., tekhn. red.; MALINKO, V.I., tekhn. red.; SVIDERSKAYA, G.V., tekhn. red.; CHERNOGOROVA, L.P., tekhn. red.; GURVICH, I.V., tekhn. red.; BUKHANOVA, N.I., tekhn. red.; NIKOLAYEVA, I.N., tekhn. red.; RADOVIL'SKAYA, E.O., tekhn. red.; TIKHOMIROVA, A.S., tekhn. red.; BELOCHKIN, P.D., tekhn. red.; LOYKO, V.I., tekhn. red.; ROMANYUK, I.G., tekhn. red.; YAROSHEVICH, K.Ye., tekhn. red.

[Sea atlas] Morskoi atlas. Otv. red. G.I. Levchenko. Glav. red. L.A. Demin. [Moskva] Izd. Glav. shtaba Voenno-morskogo flota. Vol.3. [Military and historical. Pt.1. Pages 1-45] Voennno-istoricheski. Zamestitel' otv. red. po III tomu N.S. Frumkin. Pt.1. Listy 1-45. 1958. — [Military and historical maps, pages 46-52] (Continued on next card)

ЛИТЧЕНКО, G.I.---(continued) Card 3.

Voenno-istoricheskie karty, listy 46-52. 1957.

(MIRA 11:10)

1. Russia (1923- U.S.S.R.) Ministerstvo oborony. 2. Nachal'nik  
Glavnogo upravleniya geodezii i kartografii Ministerstva vnutrennikh  
del SSSR (for Baranov). 3. Chlen-korrespondent Akademii nauk SSSR  
(for Kalesnik). 4. Deystvitel'nyy chlen Akademii pedagogicheskikh  
nauk RSFSR (for Orlov).

(Ocean--Maps)

PAVLOVICH, N. V.,

96-4-13/24

AUTHORS: Pavlovich, N. V., Cand. Tech. Sc. and Timrot, D. I.,  
Dr. Tech. Sc.

TITLE: An experimental investigation of the p-v-t relationships for gaseous and liquid methane. (Eksperimental'noye issledovaniye zavisimosti p-v-t gazoobraznogo i zhidkogo metana).

PERIODICAL: Teploenergetika, 1958, ~~1958~~ No. 4, pp. 69-75 (USSR).

ABSTRACT: Methane is a hydrocarbon that has received a great deal of study. A number of works have been devoted to the p-v-t relationships for methane but only two of these have been made at temperatures below zero centigrade. Meanwhile extensive use is being made of natural gas, which consists largely of methane, and reliable experimental tables and diagrams of the thermal-physical properties of methane and natural gas are required at low temperatures of the order of  $-170^{\circ}\text{C}$  and of pressures up to 200 atms. It was, therefore, decided to study these matters. Investigation of p-v-t relationships consists in measuring the specific gravity of the substance at known temperatures and pressures. This method is accurate for liquids at moderate temperatures and pressures. Determinations on gases are usually made

Card 1/4

96-4-13/24

An experimental investigation of the p-v-t relationships for gaseous and liquid methane.

with piezometers, measurements being taken of the volume of the piezometer and the quantity of substance required to fill it at a given temperature and pressure. Existing methods have been evaluated elsewhere. In the present work the method of hydrostatic weighing was used to determine the specific weight of both gaseous and liquid methane. Weighing at high pressures presents considerable experimental difficulties, particularly at low temperatures. A strain-gauge technique was used to overcome these difficulties. The hydrostatic weighing method then becomes a very promising one. An important part of the apparatus is the strain-gauge balance, which is illustrated in Fig.1 and described at length. It consists of a symmetrical electric bridge, each arm of which consists of a resistance wire; when the weight changes, tension increases on one pair of arms and decreases on the other pair, so that the bridge becomes electrically unbalanced. The complete experimental equipment is illustrated in Fig.2. Gas from a cylinder is passed into the working tube which contains the strain-gauge balance. This is enclosed by a Dewar flask

Card 2/4

96-4-13/24

An experimental investigation of the p-v-t relationships for gaseous and liquid methane.

in which the requisite temperature is maintained by a flow of liquid nitrogen. The method of operating the equipment is described. The experimental results are plotted in Fig.4 in the form of p-v diagrams for methane at different temperatures. With a comparative method of measurement the error of determination of the specific volume of methane includes any errors in the data on the density of the calibrating substance, which in the present case is nitrogen. The errors for nitrogen reach 0.1 - 0.15% and at sub-critical temperatures ( $-147^{\circ}\text{C}$ ) they may be 0.2%. The method of preparing pure dry methane and of measuring temperature and pressure are described. The errors in the measurement of specific weight were not greater than 0.3%, and are quite acceptable in calculations on industrial processes and apparatus. The data obtained are in good agreement with those of Kvalnes and Gaddy, which are the only figures known with respect to temperatures of  $-70$  to  $0^{\circ}\text{C}$ ; at temperatures above  $0^{\circ}\text{C}$  the results obtained are consistent with other published data. A p-v-p diagram for methane is given in Fig.5 and

Card 3/4

An experimental investigation of the p-v-t relationships for  
gaseous and liquid methane. 96-4-13/24

pressures are tabulated.

There are 5 figures, 1 table and 10 references -  
6 Russian, 3 English and 1 German.

ASSOCIATION: Moscow Power Institute.  
(Moskovskiy Energeticheskiy Institut).

AVAILABLE: Library of Congress.

Card 4/4

SOV/96-58-5-11/27

**AUTHOR:** Pavlovich, N.V., Candidate of Technical Sciences

**TITLE:** An Experimental Investigation of the Compressibility of Natural Gases (Eksperimental'noye issledovaniye szhimayemosti prirodnykh gazov)

**PERIODICAL:** Teploenergetika, 1958, Nr 5, pp 54 - 57 (USSR).

**ABSTRACT:** The coefficient of compressibility is a measure of the deviation of a real gas from the ideal and is used in calculations on the transport and utilisation of natural gas. Natural gas varies in composition from source to source and also with time. In engineering practice, compressibility coefficients of natural gases are calculated by the empirical method of mean critical parameters.

The compressibility of natural gases could be studied by investigating the compressibility of each individual component of the gas and of mixtures of these components of different compositions; this would be very laborious. A second method consists in determining experimentally the coefficient of compressibility of natural gas from each source and repeating the measurements as the composition changes. In this way, results of reasonable accuracy can be achieved in a short time; it is the method used in the present work.

The experimental installation is based on the method of strain-

Card1/3

SOV/96-58-5-1/27

## An Experimental Investigation of the Compressibility of Natural Gases

pauge weighing described in Teploenergetika, 1958, Nr 4 Gases from Stavropol' well Nr 35, Shebelinka wells Nrs 101, 21, 30 and of Ugersko well Nr 101 have been investigated. Their analyses are given in Table 1: the gas was obtained directly from the well in cylinders. The calibrating substance was pure dry nitrogen. Determinations were made of the density of each natural gas; isotherms for 0 °C are given in figure 1. The compressibilities were calculated from the gas densities, with the results shown in Tables 2-5. The tables give values of the coefficient of compressibility calculated by the mean critical method and theoretical and experimental values are compared. The experimental error in the determination of the densities of natural gases is 0.3%. The tables show considerable discrepancies between the calculated and experimental values of compressibility; the discrepancies increase with increasing pressure. Different natural gases are seen to have very different compressibilities. The tables show that calculations on the transport and utilisation of natural gases, particularly those of the Stavropol' and Shebelinka fields, will be subject to errors of up to

Card 2/3

SOV/96-58-5-11/27

An Experimental Investigation of the Compressibility of natural Gases

32% if the coefficient of compressibility is calculated from mean critical parameters.

There are 2 figures, 5 tables and 6 Soviet references

ASSOCIATION: Moskovskiy energeticheskiy institut (Moscow Power Institut)

Card 3/3 1. Natural gas--Density 2. Natural gas--Analysis 3. Natural gas --Transportation

SOV/96-58-8-13/22

**AUTHORS:** Pavlovich, H.V. (Candidate of Technical Science) and  
~~Timrot, D.L. (Doctor of Technical Science)~~

**TITLE:** An Experimental Investigation of the Viscosity of Methane  
(Eksperimental'noye issledovaniye vyazkosti metana)

**PERIODICAL:** Teploenergetika, 1958, Nr 8. pp 61-65 (USSR)

**ABSTRACT:** In designing equipment for the treatment and handling of natural gas, which consists largely of methane, a knowledge of the viscosity of methane over a wide range of temperature is required. Many determinations have been made at atmospheric pressure but the data at high pressures and low temperatures is inadequate. Moreover, available methods of viscosity measurement are not suitable for establishing such data. The procedure that was developed for this purpose is based on that used for determinations of the viscosity of water and steam. A diagram of the apparatus is given in Fig 1 and a photograph in Fig 2. It consists of three main parts: an annular balance one-third filled with mercury, a capillary tube and a cryostat. The annular balance is used to maintain a pressure-drop across the ends of the capillary and to

Card 1/3

SOV/96-58-8-13/22  
An Experimental Investigation of the Viscosity of Kethane

measure the flow of substance. The capillary is made of stainless steel EYa-17. A detailed description of the equipment is given. The capillary was 0.4726 mm diameter and 500 mm long. Most of the tests were made with Reynolds numbers below 1,000, so that flow in the capillary was laminar. It was therefore necessary to work with low loads ranging from 150 to 10 grams, but as the installation was well-balanced and sensitive this did not interfere with the accuracy. The experimental procedure is then described, particularly the adjustment and balancing of the equipment. With change in the gas pressure, even at constant temperature, the balance was disturbed and required a special corrector. The magnitude of the pressure drop on the capillary depends only on the geometry of the balance and on the torque applied by the load. The rate of flow of liquid was determined from the rate of displacement of a uniformly divided scale fixed to the tube of the annular balance. As it was difficult to ensure a perfect balance, each test was made at three different loads. The formula used to calculate the viscosity from the test results is given; typical test

Card 2/3

SOV/96-58-8-13/22

An Experimental Investigation of the Viscosity of Methane

results and calculated values appear in Table 1. The dynamic viscosities of gaseous and liquid methane that were obtained are recorded in Table 2 and Figs 3 and 4. In Fig 3 the viscosity is given as a function of density and in Fig 4 as a function of pressure and temperature. These graphs include test results of a number of other authors. The maximum error of viscosity determination did not exceed 3%. Recommended values for the viscosity of methane as a function of density are given in Table 3. This table covers the temperature range - 161.4 to + 100°C at pressures of 1 - 200 atms and includes results on the saturation line.

There are 4 figures, 3 tables, 17 literature references (Soviet)

ASSOCIATION: Moskovskiy energeticheskij institut  
(Moscow Power Institute)

Card 3/3

1. Methane--Viscosity    2. Methane--Temperature factors    3. Natural gas--Properties

PAVLOVICR, N. V.: Doc Tech Sci (diss) -- "Experimental investigation of the thermophysical properties of methane and natural gases". Moscow, 1959. 41 pp (Min Higher Educ USSR, Moscow Order of Lenin Power Engineering Inst, Chair of Engineering Thermal Phys), 150 copies (KL, No 17, 1959, 108)

TIMROT, D.L.; PAVLOVICH, N.V.

Thermodynamic properties of methane at low temperatures and  
low pressures. Nauch.dokl.vys.shkoly; energ. no.1:137-148  
'59. (MIRA 12:5)

1. Rekomendovana kafedroy inzhenernoy teplofiziki Moskovskogo  
energeticheskogo instituta.  
(Methane--Thermal properties)

L 27878-65 EPA(s)-2/EWT(s)/EPF(c)/EP2/EWP( )/T Pc-4/Pr-4/Ps-4/Pt-10 WW/  
IS/IS

ACCESSION NR: AT5004230

S/0000/54/000/000/0241/0246  
460  
641

AUTHOR: Pavlovich, N. V.; Skhikh, V. T.

TITLE: Experimental and theoretical investigation of the aggregate of thermo-  
physical properties of E-caprolactane and poly-E-caprolactane

SOURCE: AN UkrSSR. Institut tekhnicheskoy teplofiziki. Teplofizika i teplotekhnika (Thermophysics and heat engineering). Kiev, Naukova dumka, 1964, 241-246

TOPIC TAGS: polymer, monomer, synthetic fiber, caprone, thermophysical property

ABSTRACT: The article summarizes research performed in 1960-1962 at the laboratory for engineering thermophysics operated jointly by the Kiyevskiy tekhnologicheskiy institut legkoy promyshlennosti (Kiev Technological Institute of Light Industry) and Kiyevskiy kombinat sinteticheskikh i iskusstvennykh volokon (Kiev Combine of Synthetic and Artificial Fibers), on the thermophysical properties of monomer and polymer E-caprolactane. The purpose of the research was to obtain enough data to permit technological planning of caprone production and to determine the optimal conditions for the extraction of low-molecular compounds from a polymer melt under continuous manufacturing conditions. In view of the many peculiar properties of

Card 1/2

L 27878-6

0

ACCESSION NR: MT5004230

polymers (irregularity of lattice, chemical decomposition point lower than boiling point, etc.) neither the theoretical methods of statistical thermodynamics nor the experimental equipment and procedures developed for other substances are suitable. The procedures for determining the pressure-volume-temperature relations, the coefficient of linear expansion, the dependence of the density, the thermal and temperature conductivities, and other characteristics are briefly described. The reduction of the experimental data led to the calculation of 24 tables (not included in the article) listing most thermophysical properties of E-caprolactame and its polymer. It is stated in the conclusion that the methods described are of independent interest, can be used for other substances, and are being employed by other organizations. Orig. art. has: 3 figures and 1 formula.

ASSOCIATION: Kiyevskiy tekhnologicheskii institut legkoy promyshlennosti (Kiev Technological Institute of Light Industry)

SUBMITTED: 10Aug54

ENCL: 00

SUB CODE: OC, MT

NR REF SOV: 000

OTHER: 000

Card 2/2

PAVLOVICH, N.V.

Investigating the thermal conductivity of natural gases and  
methane. *Gas. prom.* 4 no. 5:45-49 *My* '59. (AIRA 12:7)  
(Gas, Natural--Thermal properties)  
(Methane--Thermal properties)

PAVLOVICH, N.V.

Experimental study of the viscosity and specific weights of natural gases and consolidated data on the viscosity of methane. Izv. vys. ucheb. zav.; neft' i gaz 4 no.8:105-111 '61.

(MIRA 14:12)

1. Kiyevskiy tekhnologicheskiy institut legkoy promyshlennosti.  
(Gas, Natural)  
(Methane)

PAVLOVICH, Nikolay Vasil'yevich; BADYL'KES, I.S., red.; IARIONOV,  
G.Ye., tekhn. red.

[Manual on the thermal and physical properties of natural  
gases and their components] Spravochnik po teplofizicheskim  
svoistvam prirodnykh gazov i ikh komponentov. Moskva, Gos-  
energoizdat, 1962. 117 p. (MIRA 16:1)  
(Gas, Natural—Thermal properties)

PAVLOVICH, N. V., TERENATSKAYA, M. K. and SKRYFNIK, S. I. (Kiev technological Institute of light industry)

"Investigations of dynamics of cooling of synthetic fiber in process of its production"

Report presented at the Section on Heat and Mass Transfer; Scientific Session, Council of Acad. Sci. Ukr SSR on High Temperature Physics, Kiev, 2-4 Apr 1963.

Reported in Teplofizika Vysokikh temperatur, No. 2, Sep-Oct 1963, p. 321, JPRS 24,651. 19 May 1964.

PAVLOVICH, N. V., TERENETSKOY, M. K., SHEMKO, I.G., FISHMAN, Ts. E., TRET'YAKOV, V. I.  
and VASHCHENKO, D. M.

"Thermal physical conditions of extraction of low-molecular combinations of units of polymer."

Report presented at the Section on Thermal-physical Properties and Non-stationary Thermal Capacity, Scientific Session, Council of Acad. Sci. Ukr SSR on High Temperature Physics, Kiev, 2-4 Apr 1963.

Reported in Teplofizika Vysokikh temperatur, No. 2, Sep-Oct 1963, p. 321, JPRS 24,651.  
19 May 1964.

PAVLOVICH, N. V. and SUKHIKH, V. T. (Kiev technological institute of light industry)

"Data on investigations of thermal physical properties of certain monomers."

Pavlovich, N. V. - Leader of section

Report presented at the Section on Thermal-physical Properties and Non-stationary Thermal Capacity, Scientific Session, Council of Acad. Sci. Ukr SSR on High Temperature Physics, Kiev, 2-4 Apr 1963.

Reported in Teplofizika Vysokikh temperatur, No. 2, Sep-Oct 1963, p. 321, JPRS 24,651. 19 May 1964.

ACC NR: AT7000950

SOURCE CODE: UR/0000/66/000/000/0019/0026

AUTHOR: Pavlovich, N. V. (Doctor of technical sciences; Deceased); Sukhikh, V. T.

ORG: Kiev Technological Institute of Light Industry (Kiyevskiy tekhnologicheskii institut legkoy promyshlennosti)

TITLE: Thermophysical properties of  $\epsilon$ -caprolactam and poly- $\epsilon$ -caprolactam

SOURCE: AN UkrSSR. Teplofizicheskiye svoystva veshchestv (Thermophysical properties of materials). Kiev, Izd-vo Naukova dumka, 1966, 19-26

TOPIC TAGS: polymer physical chemistry, heat conductivity, heat transfer coefficient, THERMAL EXPANSION, LACTAM, CAPROLACTAM

ABSTRACT: In view of the importance of the physical properties of polymers, the article presents tables of the physical properties of  $\epsilon$ -caprolactam and poly- $\epsilon$ -caprolactam as a function of temperature. The properties include density of the solid heat transfer coefficients and thermal conductivity. It is found that the density of the  $\epsilon$ -caprolactam is a linear function of temperature. The data indicate that the polymer which contains a higher concentration of low molecular weight compound melts at a lower temperature. Experimental data show that the calculated thermal expansion coefficient  $\alpha$  for polycaprolactam is  $0.40 \text{ kg/m}^3 \cdot \text{deg}^{-1}$ . The data include those determined by the authors and those reported in the literature by other authors. Orig. art. has: 11 tables.

SUB CODE: 07.20 /

SUBM DATE: 10Mar65/

ORIG REF: 005

Card 1/1

